

Page 25, lines 12-13, after "projects are" delete the return and paragraph indentation.

Page 42, line 21, delete "section" and substitute therefore --
-sections---

Page 46, lines 18-20, delete "Applicant will continue to study alternatives to this transmission concept with respect to efficiency, reliability (mainly noise immunity), and ease of implementing the corresponding receiver on the MicroTAG chip."

Page 48, line 11, delete "The requirements for the applicator are extensive, as described in Section A. 1."

IN THE CLAIMS:

Claim 1 (amended) An identification tag for application to article comprising in combination:

an application specific integrated circuit die having[,];

a write control component for writing information and programming into the integrated circuit,

a read control component for reading out information from the integrated circuit,

a first antenna component for receiving radio wave energy, and

a second antenna component for transmitting information from the integrated circuit to a receiver; and at least one capacitor for storing the radio wave energy received by the first antenna and for supplying energy to the integrated circuit,

wherein all components are located on the die.

Claims 3 (amended) An identification tag for application to article comprising in combination:

an application specific integrated circuit on a die having,
a write control component for writing information and programming into the integrated circuit,

a read control component for reading out information from the integrated circuit, and

an antenna component for receiving and transmitting information from the integrated circuit to a receiver,
wherein all components are located on the die.

Claim 4 (amended) The identification tag of claim 3, wherein there is at least one [capacitor] component that stores radio wave energy received by the antenna.

Claim 5 (amended) The [capacitor] identification tag of claim 4, wherein energy to power the identification tag is supplied by this [capacitor] component.

Claim 6 (amended) The identification tag of claim 3, wherein there is at least one antenna component for receiving the information and programming.

Claim 7 (amended) The identification tag of claim 3, wherein there is at least one antenna component for receiving radio wave energy.

Claim 8 (amended) The [antenna] identification tag of claim 7, wherein at least one antenna component for receiving radio energy is used for receiving radio wave energy.

Claim 9 (amended) The identification tag of claim 3, wherein there is at least one antenna component for transmitting information from the application specific integrated circuit.

Brook.
Claim 10 (amended) The identification tag of claim 9, wherein the antenna component for transmitting information is powered by a capacitor component or [capacitors] capacitor components which store energy.

Claim 11 (amended) The identification tag of claim 3, wherein energy can be received from sources [such as] consists of microwaves, infrared, visible light and ultraviolet light.

Claim 12 (amended) The identification tag of claim 3, wherein the write control component contains at least one memory section for storing information.

Claim 13 (amended) The identification tag of claim 12 wherein the memory section is a nonvolatile memory.

2
Cancel.

Claim 14 (amended) The identification tag of claim 3, wherein at least one multiplexer component controls flow of information and data.

Claim 15 (amended) The identification tag of claim 3, wherein at least one pulse generating circuit component is used.

B3

Claim 21 (amended) The identification tag of claim 3, wherein there is at least one shift register circuit component.

Claim 22 (amended) The identification tag of claim 9, wherein the antenna component for transmitting information is a back scatter type antenna.

Cancel

Please cancel claim 23.

B4

Claim 24 (amended) The identification tag of claim [23] 3, wherein the integrated circuit is built onto different materials, [such as] wherein the materials consist of silicone, germanium, GaAs, sapphire, or diamond.

Claim 25 (amended) The identification tag of claim [23] 3, wherein the integrated circuit is mounted on different materials [such as] wherein the materials consist of silicone, germanium, GaAs, sapphire or diamond.